

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

**In Re: Patent Application of Charles A. Eldering..**

Conf. No.: 8882 : Group Art Unit: 2623  
Appln. No.: 09/712,790 : Examiner: Sheleheda, James R.  
Filing Date: 14 November 2000 : Attorney Docket No.: T721-10  
Title: Queue Based Advertisement Scheduling And Sales

**DECLARATION OF CHARLES A. ELDERING UNDER 37 C.F.R. §1.132**

I, Charles A. Eldering, a resident of Furlong, Pennsylvania, do hereby declare and state as follows:

1. I have a Ph.D. in electrical engineering with over twenty (20) years of experience spanning the fields of electronics and microelectronics, cable and telephone communications systems, and optics. My previous experience includes working as an officer in the United States Air Force where I analyzed the reliability of microelectronic and electronic systems, research in optics and materials at the University of California at Davis (where I obtained my Ph.D.) and work in companies in the telecommunications (telephone and cable television) sector where I developed electronic and optical equipment. I am also a registered U.S. Patent Agent.
2. I have been involved in the cable television field for a sufficiently long time to observe the trends and growth in the industry. I am Chairman and President of Expanse Networks, Inc. of Doylestown, PA, a company which previously specialized in determining TV viewer market segments. As a trained engineer, business professional, patent agent, and inventor, I have observed and analyzed the market and technology used in TV marketing.
3. I am an inventor of U.S. Patent App. No. 09/712,790 ("Application") to which this declaration relates.
4. I have reviewed the Office Actions and claims relating to this Application.

5. I am familiar with the disclosures of U.S. Patent No. 6,698,020 to Zigmond *et al.* (“Zigmond”); U.S. Patent No. 6,119,098 to Guyot *et al.* (“Guyot”); and U.S. Patent Publication No. 2003/0200128 to Doherty (“Doherty”).
6. At the time of Zigmond and Doherty, the concept of enabling targeted advertising based on the nodes of a communications network was just beginning to take hold as a viable idea in TV advertising. A problem with many of these early systems was that in an attempt to provide “targeted advertising,” control of advertisement placement was taken away from the advertiser/sponsor. Until the advertiser/sponsor was given sufficient control over when their particular advertisement was to be displayed, a “targeted advertising” system would not be viable.
7. Based upon knowledge and belief, no system existed at the time of Zigmond and Doherty that gave control over the placement of advertisements by the sponsor/advertiser, while still utilizing advertising systems that targeted ads based on information known about the node that would receive the advertisement.
8. Zigmond is an example of a system that, when a triggering event occurs, places ads according to “ad selection criteria” and not based on the selection of a specific ad slot by the advertiser/sponsor. In Zigmond’s system, the advertiser/sponsor can only specify ad selection criteria and is not able to select or purchase a particular slot for placement of that advertisement. To quote Zigmond’s abstract, “The advertisement insertion device selects one of the advertisements for display to a viewer according to advertisement selection criteria combined with viewer and system information.” Thus, it is clear that it is Zigmond’s system determines which advertisement is displayed, and not the advertiser/sponsor, thereby depriving the sponsor of the opportunity to select where and when his advertisement is displayed. Zigmond does not disclose the sale of a specific slot to a third party.
9. Zigmond also fails to disclose a queue of ads and the ability to purchase specific slots within the queue.

10. Guyot fails to disclose a queue and the ability to purchase specific slots within the queue.
11. Doherty's system does not allow the advertiser to select the precise placement of his advertisement within a node-based targeted advertising system. Doherty falls short of giving advertisers certainty over when their advertisement will be displayed. As disclosed by Doherty:

As the conditions will effect the importance of playing an advertisement, the priority profile could be a function of parameters at that particular time such as:

- location or distance from a given location
  - user profile
  - frequency that the advertisement is played
  - time since it has last been played
  - number of times it has been played
  - advertising premium the advertiser is willing to pay
  - any other events which can be used in a priority profile function. (paragraphs 40-47)
12. Doherty's system does not teach the ability to purchase "specific ad queue" slots. In Doherty, it is clear that ultimately what advertisement will be displayed is based on the "priority profile." As stated in paragraph 48 of Doherty, "An advertisement will be played if its priority level is the maximum of all advertisements in the database at that particular time, as shown and described with reference to FIG. 6." This is significantly different than being able to select a specific slot in an ad queue. Doherty does not disclose a system where a user can purchase particular ad slots in the ad queue, for example slots two, four, and five.
  13. Doherty fails to completely address the problem that advertisers/sponsors desire to affirmatively select and know when their advertisements will be displayed.

14. At the time of the Application, one skilled in the art would not have recognized or found it obvious that an advertiser/sponsor could be allowed to select specific slots in an advertising queue in light of Zigmond, Guyot, and Doherty. Therefore, the suggested combination of Zigmond, Guyot, and Doherty does not teach all elements of claim 1.
15. Although the Examiner contends that the proposed combination would teach all aspects of claim 1, the combination of Zigmond, Guyot and Doherty would still lack the teaching or suggestion of allowing an the sale of specific queue slots. The result of combining Zigmond, Guyot, and Doherty would lack the teaching of selling specific advertisement slots in a queue, since there is still no teaching or suggestion of allowing advertisers/sponsors to affirmatively select a specific slot in the queue. The proposed combination would only permit an advertiser to indicate a preference that would affect the ordering of the advertisements in the queue, but would not, however, be determinative of the specific slot selection. In the proposed combination, the insertion or determination of a specific advertisement will still depend either on calculations related to the priority profile of Doherty, or on the selection by the advertisement insertion device of Zigmond, ultimately removing the ability to select from the advertiser/sponsor. Simply put, the proposed combination does not allow for the buying, selling, or selecting of a specific slot in the ad queue.
16. The claimed invention also fulfills a need unmet by Zigmond, Guyot, and Doherty and the state of the art generally at the time of the Application. It combines the advantages of targeted advertising in a node-based system with the potential for precise slot selection or purchase by advertisers/sponsors.
17. At the time of Zigmond, Guyot and Doherty, others in the field had not yet reconciled a system/method for giving sufficient control of advertisement slot section to the advertiser/sponsor while still employing the advantages of targeted advertising. One skilled in the art would not have recognized the ability to sell specific advertisement queue slots and/or that an

advertiser/sponsor could select, purchase or otherwise designate specific spots/slots in an advertising queue in light of Zigmond, Guyot, and Doherty.

I declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true, and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both under § 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issuing thereon.

October 26, 2007  
Date:

Charles A. Eldering  
Charles A. Eldering, Ph.D.

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**In Re: Patent Application of Charles A. Eldering.**

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Filing Date: 04 NOVEMBER 2000 : Attorney Docket No.: T721-10  
Title: Queue Based Advertisement Scheduling and Sales

**DECLARATION OF BERNARDO PARATORE UNDER 37 C.F.R. §1.132**

I, Bernardo Paratore, a resident of Doylestown, Pennsylvania, do hereby declare and state as follows:

1. I have a Master's Degree in electrical engineering from the University of Maryland, with over twenty-two (22) years of experience spanning the fields of telecommunications (satellite, broadband cable and telephony), microelectronics, digital signal processing, digital video and audio. My previous industry experience includes hardware and software system design, product and manufacturing design, and semiconductor design. I have seven (7) years experience in companies in cable television sector where I developed data transmission technology and digital television cable set-tops. I am also a registered U.S. Patent Agent.
2. I have been involved in the telecommunications industry for a sufficiently long time to observe the trends and growth in television program and advertising delivery. As a trained and experienced engineer, patent agent, and inventor, I have observed and analyzed the market and technology used in broadcast, cable and satellite television transmission and marketing.
3. I have reviewed U.S. Patent App. No. 09/712,790 ("Application") to which this declaration relates.
4. I have reviewed the Office Actions and claims relating to this Application.

5. I am familiar with the disclosures of U.S. Patent No. 6,698,020 to Zigmond *et al.* (“Zigmond”); U.S. Patent No. 6,119,098 to Guyot *et al.* (“Guyot”); and U.S. Patent Publication No. 2003/0200128 to Doherty (“Doherty”).
6. The system disclosed by Zigmond is related to insertion of targeted advertisements upon detection on an appropriate break, or avail, in programming of a video feed. Zigmond teaches an ad insertion device which makes a determination as to which advertisement (from among a pool of known, available advertisements) to insert into the video programming feed. Zigmond determines which advertisement to insert by applying ad selection criteria to the available advertisements. The ad selection criteria may be specified by advertisers who wish to target or guide their ads toward a particular type of consumer. The ad selection criteria may include the type of program being viewed in the feed. The ad selection criteria may also account for the “content of recently displayed advertisements,” such as the content of a competing advertiser (Zigmond, column 14, lines 13 – 21). Thus, in Zigmond, the advertisements that are inserted into any given break in the video programming feed are not controlled by, selected by, or sold to any particular advertiser, but rather, are determined by Zigmond’s system.
7. Zigmond also teaches that advertisers may have contractual relationship with the third party advertisement content provider, “to provide a predetermined type or number of advertisement exposures for the advertisers” (Zigmond, column 8, lines 22 – 28). This simply means that an advertiser pays a fee for having its advertisements displayed. This portion of Zigmond does not mean that an advertiser has the ability to specify precisely when an advertisement is displayed or that an advertiser is able to purchase a specific slot.
8. Accordingly, in Zigmond, specific slots are not sold to anyone, including advertisers. In fact, such a notion would be impossible and clearly contrary to the teachings of Zigmond, as Zigmond clearly states that the ad that is inserted is selected based on content.

9. Guyot does not teach or suggest the sale of specific slots in a program stream or a queue.
10. Doherty teaches an ad insertion system that includes an ad schedule. The advertisements in Doherty's schedule are prioritized according to a priority profile that is based on a variety of parameters including location or distance from a given location, user profile, frequency that the advertisement is played, time since it has last been played, number of times it has been played, and the advertising premium that the advertiser is willing to pay for that ad to be displayed (Doherty, paragraphs 40-47).
11. Doherty does not teach that an advertiser has the ability to purchase a specific location or slot in the schedule of ads. Rather, an advertiser may only influence the priority of an ad relative to other advertisements that Doherty places into the schedule. Accordingly, Doherty does not teach or suggest the sale of specific queue slots.
12. The combination of Zigmond, Guyot and Doherty would still lack the teaching of "selling specific queue slots," as recited in the claims. One skilled in the art would not have found it obvious that for an advertiser to have the ability to select specific queue slots. This is because none of the three references teaches the sale of specific ad slots, either alone or within a queue. Zigmond, as modified by Guyot and Doherty, would not lead one skilled in the art to understand that specific queue slots could be sold. In fact, one skilled in the art would not recognize any real modification to the ad selection system in view of Doherty's queue, and certainly not the ability to sell a specific slot in Doherty's queue.
13. Furthermore, one skilled in the art would not even be inclined to make such a combination as Zigmond's system has no need for the inclusion of a queue. Zigmond functions by selecting an appropriate ad – based on the ad selection criteria – as the break in the video programming stream approaches. As such, in Zigmond, a prioritized queue would be useless or render Zigmond's ad selection system as inoperative.



14. In view of the foregoing, the combination of Zigmond, Guyot and Doherty is improper, and even if made, would not result in a teaching or suggestion of all of the features of the claims of the Application.

I declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true, and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both under § 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issuing thereon.

Date:

10/26/07

Bernardo Paratore

B. Paratore